

a1 Fig. 12 is a schematic block diagram of an analog switch provided in gray shade voltage selecting circuit.

In the last paragraph of page 9 (which bridges over to page 10), please delete that paragraph and replace it with the following:

a2 The driving circuit is further provided with a gray shade voltage generating circuit 6 used to divide gray shade voltages including 10 voltage values from V0 to V9 and to input 128 gray shade voltages having either of positive polarity or negative polarity. It is also provided with a first gray shade voltage selecting circuit 7 and a second gray shade voltage selecting circuit 8 which are adapted to select one gray shade voltage out of 128 gray shade voltage outputted from the gray shade voltage generating circuit 6 based on high order 7 bits of the digital image data transferred from the data latch circuit 3. Into the first gray shade voltage selecting circuit 7 is inputted a positive gray shade voltage and into the second gray shade selecting circuit 8 is inputted a negative gray shade voltage. Furthermore, the driving circuit is provided with a first output circuit 9 and a second output circuit 10 in which operational amplifiers are built in and an impedance of a signal outputted from the first gray shade voltage selecting circuit 8 is converted. Between the first gray shade voltage circuit 8 and the first output circuit 9/second output circuit 10 are analog switched 60, 61 used to select connections between them. The latch control signal STB and polarity signal POL are inputted into the first output circuit 9 and second output circuit 10 from the latch control circuit 5 and the least significant bit of the digital image data is inputted from the data latch circuit 3.

In the third full paragraph of page 21 (which bridges over to page 22), please delete that paragraph and replace it with the following:

a3
According to the second embodiment, the driving circuit is provided additionally with an operational amplifier 21 connected to the positive polarity gray shade voltage selecting circuit 7 and an operational amplifier 22 connected to the negative polarity gray shade voltage selecting circuit 8. Moreover, to output terminals of the operational amplifiers 21 and 22 are connected output offset control circuits 23 and 24 through analog switched 60, 61. These output offset control circuits 23 and 24 have the same configurations as the output offset circuit 14 of the first embodiment. To these output offset control circuits 23 and 24 are connected output terminals to be connected to the display device such as TFT liquid crystal display panels or the like.

In the first full paragraph of page 22, please delete that paragraph and replace it with the following:

a4
According to the second embodiment, analog switches 60, 61 used to make a switching between the first gray shade voltage selecting circuit 7 and the second gray shade voltage selecting circuit 8 and between the output offset control circuit 23 and 24 have the same function as the resistor 12 mounted within the output circuit of the first embodiment, That is, gray shades are adjusted by using a voltage rise or drop generated by the analog switches 60, 61. Because of this, in the first embodiment, any component that can be a resistance component may be the resistor 12, however, in the second embodiment, unless the component is an analog switch, the liquid crystal display device is not driven in dot reverse.

In the last paragraph of page 23 (which bridges over to page 24), please delete that paragraph and replace it with the following:

Moreover, the driving circuit of this embodiment is provided with a first gray shade voltage selecting circuit 31 and a second gray shade voltage selecting circuit 32 adapted to select one gray shade voltage out of 128 gray shade voltages outputted from the gray shade voltage generating circuit 35 based on the digital image data transferred to the data latch circuit 36. The first gray shade voltage selecting circuit 32 are provided with transfer-gate type analog switches composed of p-channel transistors and n-channel transistors as illustrated in Figures 12. It also has a first output circuit 33 used to convert an impedance of a voltage outputted from the first gray shade selecting circuit 31 and a second output circuit 34 used to convert an impedance of a voltage outputted from the second gray shade selecting circuit 32. Configurations of the first output circuit 33 and the second output circuit 34 are the same as the output circuit in the first embodiment. However, to the LSB (Least Significant Bit) control circuit built in these circuits are inputted the least significant bit LSB of the digital image data and the latch signal STB only.

IN THE CLAIMS:

Please enter the following amended claims:

1. ~~(Amended)~~ A driving circuit of a display device for displaying a plurality of gray shades based on inputted digital image data comprising:
- ~~gray shade voltage generating means for generating a plurality of voltages;~~